

Glossary of Acronyms

ACM Application Component Management

APM Application Portfolio Management

BLC Business Leadership Council

CEA Chief Enterprise Architect

CIO Chief Information Officer

EA Enterprise Architecture

HAVA Help America Vote Act

HIPAA Health Insurance Portability and Accountability Act

IT Information Technology

ITAM IT Asset Management

RDA Records Disposal Authorization

RMS Resource Management System

TLC Technology Leadership Council

WEAT Wisconsin Enterprise Architecture Team



Glossary of Terms Adaptive

Able to support a wide variety of applications, and evolve as technology and business models change.

Agency

A governmental unit - in the narrowest sense, a governmental unit of the executive branch.

Application

A combination of programs and services designed to perform a specific function directly for the user or, in some cases, for another application program. Examples of applications include word processors, database programs, Web browsers, development tools, drawing, image editing programs, and communication program/

Application Component Management (ACM)

Application component management unleashes the full power of an application server, providing instant notification of a transaction failure, identification of the root cause of performance problems, and maximized performance of high-end e-commerce solutions. These tools monitor and manage the hundreds of details within the components of a Web application to identify the most critical performance issues, in addition to several statistics on the application server itself.

Application Delivery

Defines how applications are designed and delivered; how they cooperate, promotes common presentation standards to facilitate rapid training and implementation of new applications and functions. Good application delivery enables a high level of system integration, reuse of components and rapid deployment of applications in response to changing business requirements.

Application Portfolio Management (APM)

An application portfolio management assessment provides the enterprise with a rapid assessment of the condition of their portfolio and the delivery of a baseline scorecard. The assessment is goal, time and deliverable oriented. Benefits of application portfolio management assessment include: optimal use of staff and resources, standardized processes, project management discipline, and developing a concrete return on investment model. Application portfolio management assessment allows management to identify opportunities for: new development & implementation, integration with existing applications, enhancements/maintenance, and production, customer support.



Architecture

The art or science of designing structures. A set of designs and specifications that results in orderly arrangement of structural components. The definition of architecture that is used in this document is taken from the IBM Systems Journal: "The architecture of an IT system is the structure or structures of the system, which comprise software and hardware components, the externally visible properties of those components, and the relationships among them." The Wisconsin Enterprise Architecture principles provides a framework for the capture, categorization and classification of hardware/software product components and compliance components that forms the blueprint for deploying information technology across the State of Wisconsin's enterprise.

Architecture Blueprint

Architecture Blueprint is the term used for the captured detail and specifications that have been categorized and classified. This information defines how the IT Portfolio is built and/or will be built.

Architecture Governance Process

Architecture Governance Process is the exercise of economic, political, and administrative authority to manage the development and implementation of the EA initiative. The Architecture Governance process is composed of several primary sub-processes for formulation and publication of statewide policies, standards, guidelines and best practices for information technology. The governance process also includes the definition of the roles and relationships of the participating agencies, individuals and groups that oversee and control the development, maintenance and vitality of the EA.

Audit Trail

An audit trail is the capturing of any series of events or actions taken upon assets within the EA. Within the EA document repository, audit trails track access to view content, to create content, to change content (including that to update, modify, or append documents) and to aid in determining when the asset last went through a vitality review. Audit trails require a record be kept of who accessed the information, the date of any changes and a summary of the additions or changes made to an asset. The State may from time to time review the audit trail information if there is reason to suspect improper use of the information or to monitor the EA assets for quality control or management purposes.

Benchmark

A statement or set of conditions against which a product, system or goal is measured.



Best Practice

A technique or methodology that, through experience and research, has proven to reliably lead to a desired result. A commitment to using the best practices in any field is a commitment to using all the knowledge and technology at one's disposal to ensure success.

Business Case

A business case is the body of facts and evidence presented to the AEC to support a recommended course of action. Generally, a business case is prepared when a major change in policy, direction, technology, or deviation from the EA published Architecture Blueprint is proposed. A business case consists of a thorough analysis of business needs, opportunities, threats, and options developed for senior management's consideration and decision. The business case will also need to identify the IT project's link to enterprise objectives or strategic goals, show evidence of compliance with the enterprise information technology architecture, and indicate buy-in from project advocates.

Business Driver

Business Drivers are external and internal forces that create a need for business action or "drive" the organization's business, as well as the strategies that an organization defines in response to these forces. Because business drivers are the direction-setting mechanism for organizations, it is not inaccurate to say that business drivers are business strategies. However, not all business strategies are business drivers for the purpose of defining the EA. As an example, certain individual department or agency level strategies, that are short term or tactical in nature, may not be suitable business drivers at the enterprise-level. As an example, certain individual department or agency level strategies, that are short term or tactical in nature, may not be suitable business drivers at the enterprise-level. In essence, business drivers are those "key enterprise-level business strategies" that will have the most significant impact on the architecture process.

Business Trend

A business trend is a shift or change in the fundamental business dynamics within an industry. Business trends tend to drive enterprise-wide strategic decisions and are the result in shifts in attitudes, values, technologies and the economic landscape.

Capacity Planning

Capacity planning is a strategic function used to predict IT resource requirements. It is a proactive extension of performance management, bringing order to chaos and predictability to IT management. Capacity planning and performance management together are sometimes referred to as capacity management. Capacity planning is not just a piece of software. It's a repeatable process. It's about understanding service levels and



resource usage and aligning capacity requirements with business demands. Capacity planning is used to plan hardware and software purchases, plan upgrades and consolidate servers. It helps you match capacity to business needs and make the most efficient use of resources so you can avoid capacity shortages or wasteful underutilization. Capacity planning allows you to predict resource requirements so you can meet service level agreements while minimizing cost. Capacity planning lets you know how applications will perform before they are put into production. It allows you to experiment with hypothetical changes in business demands and hardware configurations to see what resources will be required to support optimal performance. If you're expecting a 50% increase in a particular business workload over the next 3 years, you can model the system to see how your current environment will respond, then try different configurations to find the one that's most cost efficient and meets required service levels.

Centers of Excellence

Within the medical community, "centers of excellence" are used to promote innovative research and development activities. Often these centers of excellence allow one medical facility to specialize in advanced treatment for specific diseases and promote equalization of the high cost of providing medical services to the public among several medical facilities within a single community. An information technology center of excellence may be either a stand-alone facility within an executive branch agency, local unit of government, the University of Wisconsin, or a "virtual" center. A virtual center will be designed within several units of government. Virtual centers will provide cohesive, coordinated flow of matrixed services and programs within specific technical specialties.

Chain of Custody

In evidence, the person who offers real evidence into the record at trial must account for its whereabouts from the moment it comes into their possession until the moment it is offered into evidence at trial. For example, if the real evidence offered is a blood sample in a Driving While Intoxicated trial, the nurse who drew the blood from the defendant must testify that they drew the blood, placed it in a vial and gave the vial to a runner. The runner must testify that they received the vial from the nurse, the runner took it directly from the hospital to the lab and gave it to the clerk at the front desk of the lab. The clerk must testify that they received the vial from the runner and gave the vial to a lab technician. The lab technician must testify that they received the vial from the clerk, removed the blood from the vial and performed a blood alcohol test on the blood.

Therefore, in this basic example, there are 4 people in the chain of custody: 1. Nurse, 2. Runner, 3. Clerk, and 4. Lab Technician.



Change Management

A systematic approach to dealing with change, both from the perspective of an enterprise and on the individual agency level. A somewhat ambiguous term, change management has at least three different aspects, including: Adapting To Change, Controlling Change, and Effecting Change. A proactive approach to dealing with change is at the core of all three aspects.

Component

Individual parts of the whole. The discrete parts that must be combined to produce a working and useful result. In programming and engineering disciplines, a component is an identifiable part of a larger program or construction. Usually, a component provides a particular function or group of related functions. Examples of technology infrastructure components include hardware platforms, operating systems, database systems, networks, etc.

Component-Based Development

Component-based development is a software development approach where all aspects and phases of the development lifecycle, including requirements analysis, architecture, design, construction, testing, deployment, the supporting technical infrastructure, and project management, are based on components.

Conditional Use Restriction

Occasionally, a component has some characteristic that would limit its usefulness as an enterprise product. For example, some desktop database products may be well suited for a personal desktop application but should never be used for storing, accessing, or maintaining enterprise data. These products may be accepted into the architecture but with a Conditional Use Restriction documented.

Configuration

Generally, a configuration is the arrangement - or the process of making the arrangement - of the parts that make up a whole. Examples of configurations include: In computers and computer networks, a configuration often refers to the specific hardware and software details in terms of devices attached, capacity or capability, and exactly what the system is made up of. In networks, a configuration means the network topology. In installing hardware and software, configuration is the methodical process of defining options that are provided.

Data

Numbers, characters, images, or other method of recording, in a form which can be assessed by a human or (especially) input into a computer, stored and processed there, or transmitted on some digital channel. Computers nearly always represent data in binary format. Data on its own has no meaning, only when interpreted by some kind of data processing system



does it take on meaning and become information. People or computers can find patterns in data to perceive information, and information can be used to enhance knowledge. Since knowledge is prerequisite to wisdom, we always want more data and information.

Data Management

Data management is the function of controlling the acquisition, analysis, storage, retrieval and distribution of data. Data management can involve protecting the physical security of data, ensuring back up and recovery procedures are in place, protecting confidential or private information in data, reducing redundancy in data, and establishing an enterprise data architecture.

De-Facto Standard

Standards that have become accepted and adopted although not originally defined by consent. Often are more important than standards that have been defined by consent of standards groups.

Domain

A sphere of action or thought. A set of related technologies. A set of components that have a common relationship. The MAEA Domains are logical groupings of disciplines that form the main building blocks within the architectural framework.

Enterprise

Enterprise represents an organization in total, including all subordinate entities, encompassing corporations, small businesses, non-profit institutions, government bodies, as well as other kinds of organizations.

Enterprise Architecture (EA)

The framework that defines the overall structure of the business and the information and infrastructure that supports the business, based on defined business needs and principles that guide implementation choices. Enterprise Architecture includes the overall plan for designing, implementing and maintaining the infrastructure to support the enterprises business functions and underlying networks and systems.

Entity

An information-sharing unit. All agencies (see definition above) are entities; so are courts and legislative bodies. Private organizations that share governmental information are also entities, as are private persons.

Evidence

Evidence as related to computer security means the documentary or oral statements and the material objects admissible as testimony in a court of law.



Extensible

In information technology, extensible describes something, such as a program, programming language, or protocol, which is designed so users (or later designers) can extend its capabilities. Extensibility can be a primary reason for the system, as in the case of the Extensible Markup Language (XML), or it may be only a minor feature. Approaches to extensibility include facilities (sometimes called hooks) for allowing users to insert their own program routines, the ability to define new data types, and the ability to define new formatting markup tags.

Framework

A set of assets, when brought together, forms the framing pieces to guide governments as they create architectures for their organizations.

Governance

The act or process of governing. Governance is a neutral concept comprising the complex mechanisms, processes, relationships and institutions through which citizens and groups articulate their interests, exercise their rights and obligations and mediate their differences.

Guideline

A systematically developed statement on how to implement a particular standard or convention. A good guideline is based on the best research available, rather than on opinion.

Holistic

Holistic means to emphasize the organic or functional relation between parts and the whole.

Impact Analysis

Impact Analysis is the process of mapping out the situation as it is before any of the proposed changes take place and then determining the impact on the environment of the proposed change.

Information

News, advice, or knowledge, communicated by others or obtained by personal study and investigation; intelligence; knowledge derived from reading, observation, or instruction.

Information Technology (IT)

IT (information technology) is a term that encompasses all forms of technology used to create, store, exchange, and use information in its various forms (business data, voice conversations, still images, motion pictures, multimedia, and other forms, including those not yet conceived). It's a convenient term for including both telephony and computer technology



in the same word. It is the technology that is driving what has often been called "the information revolution."

IT Asset Management (ITAM)

IT Asset Management is a powerful solution for proactively managing IT assets in a business environment. It provides full-featured asset tracking capabilities through automated discovery, hardware inventory, network inventory, software inventory, configuration management, software usage monitoring, license management and extensive cross-platform reporting. By managing IT assets on various operating platforms, and it provides a comprehensive assessment of an organization's IT asset base.

Infrastructure

The basic framework of an organization or operation. Infrastructure components are units of technology (hardware, software, networks, platforms, etc.) that support the flow and processing of information, determine how it functions and how flexible it is to meet future requirements.

Integration

The process of bringing together related parts into a single system - to make various components function as a connected system.

Interface

As a noun, an interface is either: A user interface, consisting of the set of dials, knobs, operating system commands, graphical display formats, and other devices provided by a computer or a program to allow the user to communicate and use the computer or program. A programming interface, consisting of the set of statements, functions, options, and other ways of expressing program instructions and data provided by a program or language for a programmer to use. The physical and logical arrangement supporting the attachment of any device to a connector or to another device. As a verb, to interface means to communicate with another person or object. With hardware equipment, to interface means making an appropriate physical connection so that two pieces of equipment can communicate or work together effectively.

Interoperability

The capability to allow users to readily share data among applications residing on varying combinations of hardware and software within and between existing networks. It is the ability of a system or a product to work with other systems or products without special effort on the part of the customer.

IT Portfolio

The physical installation of technologies within the State of Wisconsin.



Knowledge Management

Knowledge management is the name of a concept in which an enterprise consciously and comprehensively gathers, organizes, shares, and analyzes its knowledge in terms of resources, documents, and people skills. Knowledge management involves data mining and some method of operation to push knowledge resources to users.

Legacy Systems

An automated system built with older technology that may be unstructured, lacking in modularity, documentation and even source code.

Messaging

In the broadest terms, messaging (also called electronic messaging) is the creation, storage, exchange, and management of text, images, voice, telex, fax, e-mail, paging, and Electronic Data Interchange (EDI) over a communications network. In programming, messaging is the exchange of message (specially-formatted data describing events, requests, and replies) to a messaging server, which acts as a message exchange program for client programs.

Metadata

In general, metadata is "data about data" that is, data describing the structure, data elements, interrelationships and other characteristics of electronic information. Metadata describes how and when and by whom a particular set of data was collected, and how the data is formatted. Metadata is essential for understanding information stored in data warehouses.

Methodology

A detailed and structured approach, containing generic and tool related stepby-step guidelines, to developing, upgrading, improving or replacing application systems. Also called a "blueprint".

Middleware

Middleware is systems integration software for distributed processing and for database and user interfaces. Middleware facilitates the interaction of disparate components through a set of commonly defined protocols. The purpose of middleware is to limit the number of interfaces required for interoperability by allowing all components to interact with the Middleware using a common interface.

Migration

In information technology, migration is the process of moving from the use of one operating environment to another operating environment that is, in most cases, is thought to be a better one. Migration can involve moving to new hardware, new software, or both.



Migration Strategy

The process used to define a consistent and efficient solution for managing the impacts of moving the classification of a Product Component included in the Architecture Blueprint. A Migration Strategy must be defined when: Existing Product Components, classified as "Emerging" are moving to the classification of "Current" Existing Product Components, classified as "Current" are moving to either "Twilight" or "Sunset".

Moore's Law

Moore's Law is that the pace of microchip technology change is such that the amount of data storage that a microchip can hold doubles every year or at least every 18 months. In 1965 when preparing a talk, Gordon Moore noticed that up to that time microchip capacity seemed to double each year. The pace of change having slowed down a bit over the past few years, the definition has changed (with Gordon Moore's approval) to reflect that the doubling occurs only every 18 months.

Network

In information technology, a network is a series of points or nodes interconnected by communication paths. Networks can interconnect with other networks and contain subnetworks.

N-Tier

Applications built using a layered model approach. The internals of each tier are unique to the implementation but the interactions between the tiers are defined. N-tier does not relate to the number of systems involved. It relates to the defined interfaces that allow different tiers to be changed and/or replaced without affecting the other tiers.

Object-Oriented

An application development and database technology based on defining abstractions of real-world entities known as objects, such as invoices, orders and customers, which contain both data and procedures.

Open Records

Within the State of Wisconsin an executive branch state agency is subject to open record requirements under s. 19.35 of the Wisconsin Statutes. In the State of Wisconsin, these statutes exist to ensure that government is open and that the public has a right to access appropriate records and information possessed by state government. At the same time, there are exceptions to the public's right to access public records that serve various needs: the privacy of individuals is included among these exceptions. Exceptions are provided by both state and federal laws.

Pervasive (Computing)



The idea that technology is moving beyond the personal computer to everyday devices with embedded technology and connectivity as computing devices become progressively smaller and more powerful. Also called ubiquitous computing, pervasive computing is the trend towards increasingly connected computing devices in the environment. Trends being brought about by a convergence of advanced electronic - and particularly, wireless - technologies and the Internet.

Policies

A policy is a formal set of statements that define operating rules within the enterprise. Policies are established as a means of maintaining order, security, consistency, or other ways of successfully furthering a goal or mission.

Principle

A statement of preferred direction or practice. Principles constitute the rules, constraints and behaviors that an enterprise will abide by in its daily activities over a long period of time.

Privacy

The securing of information that should not be made public.

Procedure

A chronological event, usually containing steps to follow or a series of actions performed repeatedly in sequence in order to achieve a desired outcome.

Process Model

A process model is a "road map" that shows the activities, functions, and processes of an organization or course of action. Processes in a process model are often defined in terms of their inputs and outputs.

Procurement

Procurement is all of the processes involved in requesting, ordering, auditing, and paying for goods and services.

Portfolio Management

Under the portfolio concept, state agencies manage their IT resources as one would manage investments in a real estate or stock portfolio. The portfolio facilitates the alignment of technology investments with agency business needs and the analysis and proper mitigation of IT investment risks.

Project Management

The formalized process of managing a large project. Project management is the planning, scheduling, and controlling of project activities to effectively and efficiently reach a major goal, such as developing a program or building a facility.



Project Portfolio Management

Basically, PPM is project management at a global view within a large organization. It involves tracking and managing all of an organization's projects to guard against duplication, keep an eye on costs and resources, comply with deadlines and ensure the projects are in line with the organization's overall mission.

Proliferation

Proliferation is generally understood to be a process in which a new type of technology is introduced into an area where it was previously not yet available and the rapid spread of such technology across the enterprise.

Protocol

Rules governing transmitting and receiving of data.

Public Funding

Within the State of Wisconsin there are four main sources of public funding General Purpose Revenue (GPR), Program Revenue (PR), Segregated Revenue (SEG) and Federal Revenue (FED).

Quality of Service

Quality of Service is an increasingly important approach to managing network capacity as more sophisticated and varied Internet applications and services get deployed.

Records Disposal Authorization (RDA)

Within the State of Wisconsin, an RDA is a statement of records scheduling. It provides instructions and information as to the record content, format, length of the retention period, official record location and disposition. The RDA assists agencies in managing records throughout the record's life cycle, from creation through disposition. State statutes require that the agency prepare an RDA within one year from the time a record series is created and before any of the records can be disposed of. Some records are important enough to warrant storage at the State Records Center, and some are not. Agencies need to properly analyze their records and prepare an appropriate RDA before they may store records at the State Records Center. This ensures management of the record series from the time the record is created through the final disposition. Agencies must have an approved, current, Records Disposition Authorization (RDA) for records they wish to store at the Records Center. All RDA's for State agency records must be approved by the Public Records Board and sunset after 10 years.

Resource Management System (RMS)

The RMS software and hardware provides the infrastructure needed to perform problem, change and IT inventory management for the State of Wisconsin executive branch agencies.



Right-sizing

Within the context of IT right-sizing means designing any system to an appropriate level or anticipated level of usage.

Scalability

The ability to use the same applications and systems on all classes of computers from personal computers to supercomputers and for those applications to continue to function well as it (or its context) is changed.

Scorecard

Scorecard or Balanced Scorecard (BSC) is a concept helping organizations translate strategy into action. BSC provides management with a comprehensive picture of business operations and a methodology that facilitates the communication and understanding of business goals and strategies at all levels of an organization.

Security

Security encompasses all of the safeguards in an information system, including hardware, software, personnel policies, information practice policies, disaster preparedness, and the oversight of all these areas. The purpose of security is to protect both the system and the information it contains from unauthorized external access and from internal misuse. Security must be balanced against the need for access and the rights of citizens to privacy.

Security Forensics

Security forensics means use computer technology to investigate and establish facts in criminal or civil courts of law. As computer crimes increase, the demand for forensics understanding of systems and/or systems security breaches is needed. Evidence collection and investigation procedures in the digital world are much different than in the "real world."

Service Broker

A Service Broker can be defined as an independent professional person who provides advice, information and technical assistance to individuals. Reasons a person may choose a service broker: 1) They have little or no circle of support; 2) They have a complex network of supports and/or specialized supports for which specialized rates need to be negotiated.

Service Provider

Providing services or other activities to an organization.



Stakeholder

All of those individuals and groups which serve or are served by the enterprise - i.e., those who have a "stake" in the effective operation of the enterprise.

Standard

Standards are a set of criteria (some of which may be mandatory), voluntary guidelines and best practices. The word standard can also be used to mean commonly accepted.

Subject Matter Expert

One who is knowledgeable in the functional or technical aspects of an application system or other area of study, such as development; also called a SME.

System

A set of elements so connected or related as to perform a unique function not performable by the elements alone (Rechtin 1991). A system takes into account the interdependence of people and events, actions and conditions and institutions and organizations. A systems approach takes into consideration various "production lines" of related tasks and procedures (operating system, decision-making system, financial system, administrative system) to perform certain functions.

Systems Management

Systems management is the management of the information technology systems in an enterprise. This includes purchasing of equipment and software, distributing it to where it is to be used, configuring it, maintaining it with enhancement and service updates, setting up problem-handling processes, and determining whether objectives are being met.

Target Technology

Target technology defines the principles, standards, and best practices that build a comprehensive view of the State's approach to information technology deployment.

Technology

Tools or tool systems by which we transform parts of our environment and extend our human capabilities (Tornatzky and Fleischer 1990).

Technology Trend

Widely recognized forces or patterns of change that can be used to infer or predict the future of technology.



Twilight Technology

Technologies that do not conform to Wisconsin's Enterprise Architecture Principles, Best Practices, Technology Trends or Global Fit Criteria and are recommended to be phased out of the enterprise.

User Interface

(UI) In information technology, the user interface (UI) is everything designed into an information device with which a human being may interact - including display screen, keyboard, mouse, light pen, the appearance of a desktop, illuminated characters, help messages, and how an application program or a Web site invites interaction and responds to it. The user interface can arguably include the total "user experience," which may include the aesthetic appearance of the device, response time, and the content that is presented to the user within the context of the user interface.

Vendor

A vendor is any person or company that sells goods or services to someone else in the economic supply chain. In information technology as well as in other industries, the term is commonly applied to suppliers of technology goods and services to other companies, government and individuals.

Version Control

Version Control is the process of controlling, maintaining, and documenting maintenance and updates to programs, data, and other electronic assets. Version control systems help define the constraints on how a resource can be updated and keeps historically accurate and retrievable logs of a file's revisions.

Workflow

A term used to describe the tasks, procedural steps, organizations or people involved, required input and output information, and tools needed for each step in a business process.